## **Abstract**

A method for uplink burst equalization in broad wide access system, using the form of combining pre-training and burst equalization, that is, before transmitting user data, training the equalizer, then starting transmitting user data, in which, the equalizer uses decision user data as reference to track the changed wireless channel; if the change of channel exceeds the tracking region of equalizer, for example, the error rate exceeds threshold 1 but doesn't exceed threshold 2, the burst equalization will be performed; if the channel change exceeds the equalization region of equalizer, for example, the error rate exceeds threshold 2, the training will be performed again. By using the form of combining pre-training and burst equalization, setting different thresholds for handoff, the present invention greatly prolongs the intervals of subsequent pre-training process, thereby reducing the times of pre-training and increasing the effective bandwidth; By introducing burst equalization process, the present invention also decreases the requirement of system on operation occasion (for example, the static channel or the interval of bursts should be short), thereby increasing the application occasions of product.